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Via Electronic Filing

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Subject: Public Advocates Office Comments on 2023-2025 Draft Wildfire Mitigation

Plan Guidelines

Docket: 2023-WMPs

Dear Director Thomas Jacobs.

The Public Advocates Office at the California Public Utilities Commission (Cal Advocates) respectfully submits the following comments on the Draft Wildfire Mitigation Plan Guidelines for 2023 to 2025. Please contact Nat Skinner (Nathaniel.Skinner@cpuc.ca.gov) or Henry Burton (Henry.Burton@cpuc.ca.gov) with any questions relating to these comments.

We respectfully urge the Office of Energy Infrastructure Safety to adopt the recommendations discussed herein.

Sincerely,

/s/ Carolyn Chen

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I. INTRODUCTION

On September 19, 2022, the Office of Energy Infrastructure Safety (Energy Safety) issued *Draft 2023-2025 Wildfire Mitigation Plan Guidelines* (Draft WMP Guidelines). The Draft WMP Guidelines propose technical requirements that each utility or electrical corporation must meet in wildfire mitigation plan (WMP) submissions. The Draft WMP Guidelines also propose a process and schedule for evaluating WMP submissions. Energy Safety held a workshop to discuss the Draft WMP Guidelines on October 17, 2022.

Pursuant to Energy Safety's direction, the Public Advocates Office at the California Public Utilities Commission² (Cal Advocates) submits these comments on the Draft WMP Guidelines.³

II. WMP TECHNICAL GUIDELINES

A. General Comments

1. Energy Safety should reorganize the guidelines to reduce duplicative requirements and improve the flow of information.

Cal Advocates recommends that Energy Safety streamline the draft WMP technical guidelines to eliminate duplicative or overlapping instructions, which will enable stakeholders to review WMPs more effectively and improve the flow of information. One example of duplication occurs in the technical guidelines in Section 6.2.2 and Appendix B, Section 1.1.12.3. Both sections require utilities to insert a calculation schematic for each risk and risk component. Although Section 6.2.2 is more explicit, Appendix B appears to request the same information

¹ The Draft WMP Guidelines and relevant provisions of the Public Utilities Code frequently refer to "electrical corporations." *See, e.g.*, Public Utilities Code Section 8386. These comments use the more common terms "utilities" or "IOUs" and the phrase "electrical corporations" interchangeably to refer to the entities that must comply with the wildfire safety provisions of the Public Utilities Code.

² Hereafter, we refer to the California Public Utilities Commission as "the CPUC" in these comments.

³ The cover letter accompanying the Draft WMP Guidelines permits interested persons to file comments by October 26, 2022.

^⁴ Draft WMP Guidelines, Attachment 1 - Draft 2023 – 2025 WMP Technical Guidelines (WMP Technical Guidelines), p. 52, "The electrical corporation must provide schematics illustrating the calculation of each risk and risk component as necessary to demonstrate the logical flow from input data to outputs, including separate items for any intermediate calculations."

when it directs utilities to provide a "High-level calculation schematic showing the calculation procedure" for each risk and risk component.⁵

In addition, two sections of Appendix B require utilities to provide the same high-level graphics and narratives. Specifically, Section 1.1.11 instructs utilities to provide, "high-level information on the calculation of each risk and risk component used in its risk analysis," while Section 1.1.12.3 asks for the same high-level information.

To improve the flow of information, Section 6.2.1 ("Risk and Risk Component Identification") should be introduced prior to Section 6.1.2 ("Summary of Risk Models"). The visual (Figure 6-2) and definitions contained in Section 6.2.1 are better placed before summarizing risk components (Table 6-1). Identifying and defining risk components before summarizing risk components establishes a common foundation and aids in the general understanding of the utilities' risk assessment frameworks. As an example, a utility could summarize their risk components based on its internal definitions only to find out in the next section they are required to adopt different terminology.

Energy Safety should also consider combining and eliminating sections to achieve a more efficient structure. This would aid stakeholders and utilities with writing, understanding, and evaluating wildfire plans. To achieve this goal, Energy Safety should consider the following specific areas for simplification:

- Merge Section 6.1.2 with Section 6.2.1.
- Eliminate instructions to insert Figure 6-3 into Section 6.2.2, as well as Appendix B, Sections 1.1.11 and 1.1.12.3.
- Remove directions to provide narratives for high level risk components in both Sections 1.1.11 and 1.1.12 of Appendix B.

⁵ WMP Technical Guidelines, Appendix B, Section 1.1.12.3, p. 16.

⁶ WMP Technical Guidelines Appendix B: Section 1.1.12.3 "Risk Component Calculation" and Section 1.1.11 "Summary Documentation."

⁷ WMP Technical Guidelines, Appendix B, p. 6.

⁸ WMP Technical Guidelines, Appendix B, p. 16.

B. Section 6: Risk Methodology and Assessment

1. Energy Safety should clarify the terms "risk model" and risk component."

Cal Advocates recommends that Energy Safety clearly define the key terms introduced in Section 6 and Appendix B in the technical guidelines. Leaving utilities and stakeholders to determine their meaning without additional detail will lead to confusion and WMP submissions that are difficult or impossible to compare. The technical guidelines appear to use "risk models" and "risk components" interchangeably, which creates uncertainty surrounding definitions.

First, in Section 6.1.2, the draft WMP guidelines request utilities to provide a summary table of "risk models" (Table 6-1). However, the exemplar shows a table of "Risk Components" that are not defined until Section 6.2.1. In Table 6-1, it is unclear whether Energy Safety is instructing each utility to provide information on "risk models" or "risk components." A column heading in Table 6-1 is titled as "Risk Component" which seems to be at odds with the table's title, "Summary of Risk Models." Energy Safety should clarify the requirements of Table 6.1 so that utilities provide comparable information.

Second, Appendix B, Section 1.1.11 is titled "Model Documentation," however, the first subsection refers to "each risk and risk component used in its risk analysis." The subsection next instructs utilities to provide a "high-level bow tie schematic showing the inputs, outputs, and interaction between risk components in the format shown in Figure C.10-1." Yet, Figure C.10-1 illustrates not a bow-tie schematic of a risk component, but instead illustrates the inputs and output of the Ignition Frequency Model.

2. Energy Safety should provide clear definitions of key terms related to risk.

In several places, the draft technical guidelines use unclear terms to refer to places with elevated or heightened risk. An example can be found in Section 6.4.1, where technical guidelines instruct each utility to "identify areas within its service territory that are at an *elevated* risk of wildfire" (emphasis added). It is not clear if Energy Safety is referring to overall risk,

⁹ WMP Technical Guidelines, Appendix B, pp. 6-7, Section 1.1.11 (Summary Documentation) requires graphics and schematics describing "Risk Components" where "Risk Model" information is shown in the exemplar Fig C.10-1.

¹⁰ WMP Technical Guidelines, p. 62

ignition risk, or Public Safety Power Shutoff (PSPS or de-energization) risk, which are all defined in Section 6.2.1, when referring to "heightened risk" or "elevated risk." At a minimum, Energy Safety should define the terms "heightened risk" and "elevated risk," as these terms are not currently defined in the Draft WMP Guidelines.

3. Energy Safety should clarify the intent of the design scenarios and design conditions.

The Draft WMP Guidelines outline design scenarios that utilities must consider in their wildfire and PSPS risk analyses. 11 Cal Advocates supports Energy Safety's efforts to drive consistency in the risk analyses between the various electric utilities. However, the Draft WMP Guidelines are unclear on how utilities should consider the listed design conditions. The Draft WMP Guidelines include four design conditions for wind load, two for weather, and three for vegetation. 12 The Draft WMP Guidelines list example design scenarios consisting of various combinations of these design conditions, but do not clarify which scenarios utilities must consider.

While utilities should consider all design scenarios relevant to their unique service territories, it would be beneficial to direct all utilities to examine a common baseline set of design scenarios to compare risk analysis methods and outputs across utilities. Cal Advocates proposes that the Draft WMP Guidelines require utilities to consider the following design scenarios at a minimum: 13

- Current conditions (four scenarios): weather condition 1, vegetation condition 1, all four wind conditions.
- Near-term boundary conditions (two scenarios): weather condition 1, vegetation condition 2, wind conditions 1 and 4.
- Long-term boundary conditions (two scenarios): weather condition 2, vegetation condition 3, wind conditions 1 and 4.

These proposed design scenarios would cover a reasonable range of current conditions across the utilities' service territories, as well as the extreme boundaries of near-term and long-

¹¹ WMP Technical Guidelines, p. 57.

¹² WMP Technical Guidelines, pp. 57-59.

¹³ Elsewhere in these comments, Cal Advocates recommends modifications to several of the conditions outlined in the WMP Technical Guidelines. The scenarios proposed here use the definitions as currently written in the WMP Technical Guidelines.

term future conditions. This would enable utilities to fully explore the present risk, while developing an understanding of the bounds of future risk.

Energy Safety should update the Draft WMP Guidelines to require utilities to examine these proposed scenarios. Energy Safety should also leverage insights from the ongoing Risk Modeling Working Group to determine what additional scenarios would benefit utility risk analyses.

4. Energy Safety should clarify several of its proposed design conditions.

The Draft WMP Guidelines list four design conditions for wind load, two for weather, and three for vegetation. Let Several of these conditions are unclear. The following table lists specific recommendations to improve the design conditions.

| The probability and interval of exceedance appear to be incorrectly calculated in this condition. The 95th percentile of daily maximum values implies that one should expect 18 days per year with winds higher than the stated value, rather than 1 day in 20 years. Wind Load Condition 2 Recommendation: For clarity, only one definition should be used in this design condition. The 95th percentile of daily maximum values is too low to significantly strain utility equipment. An appropriate threshold for very high winds "intended to capture annual high winds observed in the region" would be the 99.5 percentile of daily maximum values, implying winds that are | Design Condition ¹⁵ | Recommendations |
|---|--------------------------------|--|
| expected to occur one or two days per year. | Wind Load Condition 2 | incorrectly calculated in this condition. The 95th percentile of daily maximum values implies that one should expect 18 days per year with winds higher than the stated value, rather than 1 day in 20 years. Recommendation: For clarity, only one definition should be used in this design condition. The 95th percentile of daily maximum values is too low to significantly strain utility equipment. An appropriate threshold for very high winds "intended to capture annual high winds observed in the region" would be the 99.5 percentile of daily maximum values, implying winds that are |

¹⁴ WMP Technical Guidelines, pp. 57-59.

¹⁵ WMP Technical Guidelines, pp. 57-59.

| Weather Condition 1 Weather Condition 2 | These conditions require utilities to consider "a range of wind speeds, directions, and fuel moistures." The inclusion of wind speed in the weather design conditions appears to overlap with the defined wind load design conditions. Furthermore, the weather conditions do not appear to consider ambient temperatures. Recommendation: Energy Safety should examine whether wind speed should be replaced with temperature in the weather design conditions. | |
|---|---|--|
| | This condition requires utilities to consider the changes in expected fuel load over the period of 2023-2025. It is unclear why vegetation conditions would be materially different two years in the future compared to the present. Climate change produces little change in this time horizon and it is unlikely that vegetation regrowth will be substantial during this period. Moreover, any vegetation regrowth will be counterbalanced by new wildfires or fuel treatment projects. In sum, there is little difference between vegetation design conditions 1 and 2. | |
| Vegetation Condition 2 | It may be more useful for utilities to consider the 2026-2028 expected fuel load, with the purpose of identifying high-risk areas for the next WMP cycle and beginning to scope grid hardening projects in those areas. | |
| | Recommendations: | |
| | (1) Energy Safety should consider redefining Vegetation Condition 2 to focus on the 2026-2028 period. | |
| | (2) To the extent that utilities are required to forecast short-term changes in fuel load, Energy Safety should state what causal factors utilities need to consider. | |
| | This condition requires utilities to examine "long-term" conditions, but does not define this term. | |
| Vegetation Condition 3 | Recommendation: To ensure consistency between utilities, "long-term" should be clearly defined, either as a specific time in the future (e.g. expected vegetation conditions in 20 years) or as an expected steady-state vegetation condition. | |

| | This condition requires utilities to consider "regrowth of | | |
|------------------------|--|--|--|
| | previously burned and treated areas and changes in predominant | | |
| | fuel types." However, predicting regrowth without also predicting | | |
| | vegetation loss due to future treatments or wildfires would create a | | |
| Vegetation Condition 3 | systematic bias toward overestimating fuel loads. | | |
| | Recommendation: To accurately model real-world future | | |
| | conditions, this condition should also require utilities to consider | | |
| | the effects of future fuel-reduction treatments, and the effects of | | |
| | future wildfires. | | |

5. Energy Safety should make clarifications and improvements to the Risk Methodology and Assessment section.

Energy Safety should make several adjustments and clarifications to section 6 of the technical guidelines.

First, Section 6.1.1 directs the IOUs to "describe the methodology and underlying intent of this risk assessment in no more than five pages, inclusive of all narratives, bullet point lists, and any graphics." Setting page limits on specific narratives can be beneficial, since the comprehensive WMPs can run to hundreds of pages. However, in this instance, imposing a five-page limit is too limiting to satisfactorily address the complexities of how a utility conducts risk assessment.

Requiring the IOUs to condense their risk assessment methodology to a mere five pages is likely to produce brief and superficial overviews that fail to provide sufficient useful information. In the 2022 WMP Updates the three large IOUs each provided about ten to fifteen pages worth of information and data on risk assessment methods and purposes. Limiting the amount of information presented on this topic to five pages would impair the ability of stakeholders and Energy Safety to evaluate the IOUs'

¹⁶ WMP Technical Guidelines, p. 41.

¹⁷ PG&E's 2022 original WMP Update submission totaled 1,079 pages in length, SCE's 2022 original WMP Update submission totaled 799 pages in length, and SDG&E's 2022 original WMP Update submission totaled 699 pages in length.

¹⁸ Based on Cal Advocates' analysis of PG&E, SCE, and SDG&E 2022 WMP Update submissions.

practices and the quality of their analyses. Cal Advocates recommends that Energy Safety increase the limit to 12 pages.

Next, Section 6.4.1.1 directs the IOUs to "identify areas where its service territory has a heightened risk of fire (independent of HFTD status)." The guidelines require the IOUs to provide geospatial maps with "contour levels" in three separate categories: "Top 5 percent," "Top 20 percent," and "Bottom 80 percent." It is unclear what exactly these three percentage groupings represent. The guidelines should explain what the numerator and denominator are for these percentages.

Lastly, Section 6.4.2 directs the IOUs to provide tables of high-risk circuits or segments with the corresponding risk scores for each (Table 6-5).²⁰ The data reported in these tables would be best provided in an Excel format, which is easier to manipulate and analyze than a fixed PDF table. To resolve this issue, Energy Safety should make this data part of the non-spatial data tables.²¹

These recommended changes would serve to advance the detail and clarity of data that the IOUs submit in Section 6 of the WMPs. These improvements would likely lead to enhanced analysis and understanding of the utilities' risk assessment methods.

C. Section 7: Wildfire Mitigation Strategy Development

1. Energy Safety should increase the page limit for the overview of risk evaluation.

Section 7.1.1 directs the IOUs to "provide a brief narrative of its risk evaluation approach ... in a maximum of two pages, inclusive of all narratives, bullet point lists, and any graphics." Similar to discussion above regarding the five-page limit for each utility's risk assessment methodology, this two-page limit is too restrictive for an informative description of each utility's risk evaluation approach. Limiting this narrative to two pages (including graphics) would result in cursory and vague statements. Energy Safety should increase the limit to at least five pages, so that the IOUs can provide a

¹⁹ WMP Technical Guidelines, pp. 62-63.

²⁰ WMP Technical Guidelines, p. 63.

²¹ Cal Advocates believes that Table 6-5 could be added in between Table 7.2 and Table 8 of the non-spatial data tables (WMP Attachment B).

²² WMP Technical Guidelines, p. 71.

meaningful overview on their risk evaluation approaches. Energy Safety should also clearly specify how this section is different than the overview of risk assessment methods and purposes that is required in Section 6.1.1.

2. Energy Safety should continue to require IOUs to analyze and report on the risk-spend efficiency (RSE) of mitigation initiatives.

The Draft WMP Guidelines have eliminated the term "risk spend efficiency," "RSE," and any variants throughout. Energy Safety should continue to require utilities to analyze and report the risk-spend efficiency of mitigation initiatives. The RSE, as defined in the Commission's Safety Model Assessment Proceeding (Rulemaking 20-07-013), is a valuable tool for examining whether utilities are using their resources wisely to eliminate as much wildfire risk as possible. 24

Cal Advocates has previously highlighted the value of estimating RSEs.²⁵ RSEs help stakeholders and Energy Safety determine whether an IOU is using its staffing and monetary resources in an efficient manner. Failing to appropriately incorporate RSEs into the mitigation decision-making process can lead utilities to expend their resources in expedient locations rather than focusing on reducing the maximum risk. Indeed, Energy Safety noted this precise concern with PG&E's decision-making process,²⁶ and required PG&E to incorporate RSE estimates early in the decision-making process in its 2023 WMP.²⁷ Energy Safety should apply this reasonable requirement to all utilities. Energy

²³ In the October 17, 2022 workshop on the Draft WMP Guidelines, Energy Safety stated that the Draft WMP Guidelines, particularly Section 7.1, do not ask for risk-spend efficiency (RSE) information but utilities could include that information if RSEs are important to their risk evaluation and decision-making process.

²⁴ https://apps.cpuc.ca.gov/apex/f?p=401:56:0::NO:RP,57,RIR:P5_PROCEEDING_SELECT:R2007013.

²⁵ See Comments of the Public Advocates Office on the 2020 Wildfire Mitigation Plans, April 7, 2020; Comments of the Public Advocates Office on the 2021 Wildfire Mitigation Plan Updates of the Large Investor-Owned Utilities, March 29, 2021.

²⁶ "Upon review, Energy Safety found that PG&E's system hardening decision-making flowchart does not give sufficient weight to quantitative factors such as costs, risk reduction values, and RSE estimates. For example, the flowchart hierarchy prioritization is influenced more by construction limitations than by RSE estimates. This may lead PG&E to fast-track more expedient locations rather than considering the option with the highest RSE estimate." *Draft Decision on 2022 Wildfire Mitigation Plan Update: Pacific Gas and Electric Company*, October 6, 2022, p. 143.

²⁷ Area for continued improvement PG&E-22-34, Draft Decision on 2022 Wildfire Mitigation Plan

Safety should revise the Draft WMP Guidelines to include the continued requirement that all utilities analyze the RSE of each mitigation. Energy Safety should also require the IOUs to discuss how they use RSE in their decision-making in Section 7.1 (Risk Evaluation).

D. Section 8.2: Vegetation Management and Inspections

1. Energy Safety should require each utility to discuss the internal and external labor mix used in their vegetation management programs.

Utilities often utilize various combinations of external and internal labor for vegetation management activities such as pre-inspections or corrective work. The Draft WMP Guidelines do not require that utilities discuss which programs use external labor, internal labor, or a combination of both. Energy Safety should revise the guidelines to include a subsection for utilities to discuss their vegetation management staffing resources for each program.

Cal Advocates has noted in previous comments that each vegetation management labor resource has its advantages and disadvantages, but there are often important reasons behind utilities' staffing decisions. For example, utilities may not be able to fully staff a vegetation management program effectively and will turn to external labor resources to fill in any gaps in their organizations. In contrast, relying on internal labor typically offers increased control and accountability over the work performed because employees report directly to the vegetation management program management office.

Energy Safety should revise the Draft WMP Guidelines to instruct each utility to clearly distinguish which vegetation management programs or activities utilize external or internal labor, in what proportions. The utility' discussion of vegetation management labor resources should include the reasoning behind the utility's decision to use external or internal labor, and whether the utility plans to revise this mix in the future.

Update: Pacific Gas and Electric Company, October 6, 2022, p. 183.

²⁸ Comments of the Public Advocates Office on the 2022 Wildfire Mitigation Plan Updates of the Large Investor-Owned Utilities, April 21, 2022, p. 40.

2. Energy Safety should clarify the meaning of vegetation management "open work orders."

Section 8.2.7 discusses "open work orders" without defining this term. It is unclear whether Energy Safety intends this term to include only vegetation maintenance (corrective work) or also inspections and quality control activities.²⁹

Vegetation management work orders generally fall into categories such as planned or reactive work, which are further sub-categorized into activities such as:

- Pre/Inspections (detailed and patrol)
- Vegetation maintenance (corrective work)
- QA/QC (field and desktop audits)

The Draft WMP Guidelines should clarify the definition of "open work orders," to provide an accurate understanding of each utility's progress toward its vegetation management goals and targets.

3. Energy Safety should revise the requirements for reporting open work orders.

The Draft WMP Guidelines require utilities to report the number of open work orders for vegetation management. However, a deeper understanding beyond the total number of "open work orders" is necessary to accurately gauge progress towards vegetation management goals and targets. For example, a utility may have open inspection work orders that will not be due, or even scheduled for completion, until the following year because the utility is inspecting the circuit every two years. The inclusion of work orders that are not due in the year of the WMP would overstate the amount of vegetation management work the utility must actually complete.

In order to identify trends and monitor progress, the Draft WMP Guidelines also instruct each utility to "graph open work orders over time as reported in the QDRs." A more effective way to evaluate the performance of a utility's vegetation management program is to direct each utility to provide a quarterly "aging report" that organizes open vegetation maintenance

²⁹ WMP Technical Guidelines, p. 123.

³⁰ WMP Technical Guidelines, p. 124.

³¹ WMP Technical Guidelines, p. 124.

(corrective work) by the number of days beyond the compliance due date for each HFTD area. An example of this tabular report can be found below:

Table of VM Corrective Work Orders Categorized by days past compliance deadline

| HFTD Area | 0-30 Days | 31-90 Days | 91-180 Days | 181+ Days |
|-------------|-----------|------------|-------------|-----------|
| Non-HFTD | | | | |
| HFTD Tier 2 | | | | |
| HFTD Tier 3 | | | | |

In comparison to trending the total "open work orders" each quarter, each utility's quarterly "aging report" would enable Energy Safety and all stakeholders to quickly determine where vegetation management activities are being completed on time and where work is being delayed beyond compliance dates. Therefore, Energy Safety should direct each utility to submit an aging report for open vegetation maintenance (corrective work) work orders, such as the example above. Energy Safety should direct the utilities to submit this data on a quarterly basis, with the Quarterly Data Reports.

4. Energy Safety should require each utility to describe the scope of their quality assurance and quality control (QA/QC) programs for vegetation management.

The Draft WMP Guidelines address requirements for vegetation management QA/QC. However, the guidelines don't address whether vegetation management QA/QC efforts should cover vegetation inspections as well as vegetation maintenance (corrective work). Cal Advocates observed this issue with PacifiCorp, where only tree trimming and removals were in the scope of its QA/QC program.³² Energy Safety should include a requirement to conduct QA/QC audits on both vegetation inspections and vegetation maintenance (corrective work) in the final WMP guidelines.

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³² PacifiCorp 2022 WMP Update (Revision), p. 203.

E. Section 8.3: Situational Awareness and Forecasting

1. Energy Safety should improve the reporting requirements on situational awareness initiatives.

Section 8.3.1.2 directs the IOUs to "list all targets it will use to track progress on its situational awareness and forecasting for the next three years (2023–2025)." However, the requirements currently listed in the Draft WMP Guidelines do not include sufficient information to be helpful to stakeholders' analysis of the IOUs' situational awareness and forecasting initiative targets. The current requirements lack detail on where the utilities will implement these initiatives. Energy Safety should direct utilities to report their situational awareness targets disaggregated by HFTD tier. Since Energy Safety uses the "x% risk impact" metric throughout the Draft WMP Guidelines, it is critical that the guidelines show how the location of a project can affect risk impact.

Section 8.3.3.3 directs the IOUs to describe the planned improvements that they are making to Grid Operation Monitoring Systems. However, the Draft WMP Guidelines do not require the IOUs to identify the locations that will be affected by the planned improvements, either at a general level (e.g., the HFTD tier) or a specific level (i.e., circuit-segments). Energy Safety should amend the guidelines to include this information, specifically by adding a new column to Table 8-26 for the "location of segment/circuits affected by improvement." This information will allow stakeholders and Energy Safety to analyze whether the planned improvements will benefit the greatest possible number of customers or the riskiest areas within an IOU's territory.

The WMP guidelines under Section 8.3.4.1 direct the IOUs to "report on the ignition detection sensors and systems, that are currently in use, highlighting any improvements made since the last WMP." Energy Safety should amend the guidelines to include location information as an additional column in Table 8-27. Specifically, the bulleted item "General location of detection sensors (e.g., HFTD or entire service territory)" should be included in the table rather than the accompanying narrative. 35 This

³³ WMP Technical Guidelines, p. 129.

³⁴ WMP Technical Guidelines, pp. 139-140.

³⁵ WMP Technical Guidelines, p. 139.

change will provide greater clarity on where sensors are being implemented, which will benefit stakeholder analysis.

The Draft WMP Guidelines require utilities to make their ignition consequence model and input data "available on request from Energy Safety." This language is too limiting. Energy Safety should amend it to state that the IOUs must reproduce the wildfire forecast data and model "on request from Energy Safety *or any stakeholder*." Amending this language will allow all stakeholders to understand the IOUs' ignition consequence calculations. This is also consistent with the CPUC's Rules of Practice and Procedure, which require that computer models be transparent to all parties in a proceeding. 37

Energy Safety should revise the Draft WMP Guidelines in line with the recommendations described above. These changes will provide greater insight into situational awareness and forecasting initiatives. This will aid stakeholders' analysis of whether the IOUs are setting appropriate targets and prioritizing areas that provide the greatest achievable wildfire risk reduction.

F. Section 8.5: Community Outreach and Engagement

1. Energy Safety should improve the reporting requirements on community outreach.

Section 8.5.2 directs the IOUs to provide a "description of the various outreach and education awareness programs that the electrical corporation implements before, during, and after wildfire, vegetation management, and PSPS events." As part of this requirement the IOUs must report data on target groups (such as access and functional needs customers). While it is informative to know which specific populations a utility has identified, these populations are constantly changing. The guidelines should require the IOUs to report the number of individuals who were notified via the respective outreach and education programs. To address this issue, Energy Safety should add a column titled "Number of Individuals Notified" to Table 8-59. This will help

³⁶ WMP Technical Guidelines, pp. 146-147: "Input data and model version required to reproduce the wildfire forecast recorded and available on request from Energy Safety."

³⁷ CPUC Rules of Practice and Procedure, Rules 10.3 and 10.4.

³⁸ WMP Technical Guidelines, p. 203.

stakeholders assess whether programs are effective in notifying and informing customers. Examining the effectiveness of outreach may also enable IOUs to streamline such programs in the future.

Section 8.5.5 directs each IOU to "provide a high-level overview of its policy for sharing best practices and collaborating with other electrical corporations on technical and programmatic aspects of its WMP." Currently, the Draft WMP Guidelines do not address interstate collaboration, which is an important issue for some utilities. To ensure that cross-border issues are considered, Energy Safety should amend the guidelines to specify that the IOUs should report on collaboration with electrical corporations in and outside California.

G. Section 9: Public Safety Power Shutoffs

1. Energy Safety should require greater transparency of Multi-Attribute Value Functions (MAVF) relating to Public Safety Power Shutoff (PSPS) models.

The Draft WMP Guidelines direct the IOUs to "compare and evaluate the relative consequences of PSPS and wildfires" and "outline [the] tactical and strategic decision-making protocols for initiating a PSPS event." However, these guidelines will not yield enough information to support stakeholders' analysis of the IOUs' PSPS performance. 41

In recent PSPS events, the large IOUs have used Multi-Attribute Value Functions (MAVF) to assess the risk to customers caused by PSPS against the risk posed by a wildfire ignition. 42 Because the IOUs rely so heavily on MAVF calculations in their PSPS decision-making, it is critical that the WMP Guidelines clarify the linkage between MAVF and PSPS.

³⁹ WMP Technical Guidelines, p. 209.

⁴⁰ Per an informal discussion with Liberty Utilities (CalPeco Electric) during the 2022 WMP season, Cal Advocates learned that Liberty's service territory is supplied by NV Energy transmission lines coming in from Nevada. Nevada has its own PSPS-like protocols which may cause downstream power loss in Liberty territory even if conditions in Liberty's territory don't warrant a PSPS event. During this discussion, Liberty stated that it has good communication with NV Energy on when this will happen and that Liberty will communicate with its customers and public safety partners if that happens. According to Liberty as of the time of this discussion, Liberty has never experienced a situation such as this.

⁴¹ WMP Technical Guidelines, p. 221.

⁴² See, e.g., PG&E PSPS Post-Event Report for its September 20 to 21, 2021 PSPS Event, p. 31.

Currently, regarding risk calculations, the Draft WMP Guidelines request "schematics illustrating the calculation of each risk and risk component as necessary to demonstrate the logical flow from input data to outputs, including separate items for any intermediate calculations." This requirement is insufficiently specific; it is likely to yield only general information about how utilities use MAVF in PSPS decision-making. The IOUs already provide high-level descriptions of these issues in their PSPS post-event and post-season reports, as well as in their WMPs. Such high-level descriptions of decision-making factors, particularly those related to the assessment of risks and harms to customers caused by PSPS, are not conducive to effective stakeholder scrutiny of the IOUs' assumptions. 45

To resolve this issue, Energy Safety should require the IOUs to provide more detailed descriptions and concrete examples of their MAVF methodologies. This is consistent with Energy Safety's broader push for greater modeling transparency. Specifically, the final WMP guidelines should require the IOUs to explain in detail:

- How MAVF is calculated,
- How the IOU weights each variable, and
- How MAVF is used to determine PSPS risk and consequences.

Energy Safety should also require each utility to provide model documentation that includes real world examples of the specific values and calculations it uses when conducting PSPS risk and consequence analysis (or hypothetical examples if the utility has not executed any PSPS events recently). If the IOU cites supporting documentation not readily available on the Energy Safety docket, then the utility should attach the document as an appendix to its WMP.

These recommended changes would improve the clarity of the IOUs' reporting on how they weigh risks to customers caused by PSPS against the risk of wildfire ignition. Increased clarity will lead to improved stakeholder understanding of the IOUs' PSPS decision-making processes.

⁴³ WMP Technical Guidelines, p. 52.

⁴⁴ See, e.g., PG&E 2022 WMP Update, p. 199.

⁴⁵ Cal Advocates made similar arguments in its Comments on the Large IOUs 2022 WMP Update Submissions. *See* Cal Advocates Comments on General Issues in the 2022 WMP Updates of the Large IOUs, p. 22.

H. Section 10: Lessons Learned

1. Energy Safety should require all utilities to identify lessons from past utility-ignited catastrophic wildfires.

The Draft WMP Guidelines require utilities to "provide a summary of new lessons learned ... and any ongoing improvements to address existing lessons learned." This statement is vague and does not list specific sources of lessons. For example, the Draft WMP Guidelines do not explicitly require utilities to identify lessons from catastrophic wildfires. 47

Cal Advocates has previously highlighted the importance of analyzing the root causes of utility-ignited catastrophic wildfires and learning from those analyses.⁴⁸ In its Revision Notice to PG&E's 2022 WMP Update, Energy Safety required PG&E to take the following steps for each PG&E-ignited catastrophic wildfire since 2017:⁴⁹

- List the cause(s) of each catastrophic wildfire and any associated lessons learned, and
- Detail the specific measures PG&E is taking to i) directly mitigate the causes of past PG&E-ignited catastrophic wildfires, and ii) integrate lessons learned from past PG&E-ignited wildfires into its wildfire mitigation strategy.

Understanding the causes of past wildfires and taking effective measures to mitigate those causes in the future is critical to avoid a repeat of past catastrophes. Energy Safety should revise the Draft WMP Guidelines to require all utilities to engage in the same exercise it has required of PG&E.

⁴⁶ WMP Technical Guidelines, p. 223.

⁴⁷ WMP Technical Guidelines, p. 223 lists "Findings from fire root cause analysis" only as an example source of lessons learned.

⁴⁸ See Public Advocates Office Comments on PG&E's Revised 2022 WMP, August 10, 2022, pp. 9-10.

⁴⁹ Revision Notice For Pacific Gas And Electric Company's 2022 Wildfire Mitigation Plan Update, May 26, 2022, p. 5.

III. APPENDIX B: SUPPORTING DOCUMENTATION

A. Sections 1.1.11 to 1.1.13

1. Energy Safety should limit Appendix B to detailed information.

The apparent intent of Appendix B is to contain highly detailed information for reference, while the main body of the WMP contains more accessible, simplified information. However, this division has been imperfectly implemented. Currently, Appendix B instructs utilities to provide high level documentation and graphics, which should be placed in the body of the WMP.

The following sections of Appendix B contain instructions to provide *high level* information:

- Section 1.1.11: Summary Documentation 51
- Section 1.1.12.3: Risk and Risk Component Calculations 52
- Section 1.1.13.1: Areas of Heightened Risk of Fire 53
- Section 1.1.13.1: Fire Potential Index 54

To resolve this issue, Energy Safety should instruct utilities to place all information and graphics that are essential for understanding the issue in the body of the WMP. In Appendix B, utilities should provide reference information: complex narratives, detailed graphs and tables, mathematical formulae, lists of data inputs, and detailed descriptions of data processing techniques. Thus, Appendix B should be available as a resource for readers who wish to dig deeper into a given issue but should not be crucial for a reader to understand the utility's risk analysis techniques or decision-making processes. This approach will advance Energy Safety's efforts to increase modelling transparency while also streamlining the WMP.

⁵⁰ Energy Safety, Pre-Workshop Material, April 19, 2022.

⁵¹ WMP Technical Guidelines, Appendix B, p. 6: "The electrical corporation must provide high level information on the calculation of each risk and risk component used in its risk analysis."

⁵² WMP Technical Guidelines, Appendix B, p. 16: "For each risk and risk component, the electrical corporation must provide" a high-level description, high level bow tie schematic, and high-level calculation schematic.

⁵³ WMP Technical Guidelines, Appendix B, p. 26: the electrical corporation must provide a high-level description, high level bow tie schematic, and high-level calculation schematic.

⁵⁴ WMP Technical Guidelines, Appendix B, p. 26: the electrical corporation must provide a high-level description, high level bow tie schematic, and high-level calculation schematic.

IV. WMP PROCESS AND EVALUATION GUIDELINES

A. Section 2: The Three-Year WMP Process

1. Energy Safety should work with utilities and stakeholders to refine its proposed year-ahead process.

Cal Advocates fully supports Energy Safety's proposed year-ahead process. Over the 2020-2022 WMP cycle, utilities submitted WMPs beginning in February of each year, with the plans covering the same calendar year. The plans were approved by Energy Safety and ratified by the CPUC as early as June in 2020, and potentially as late as December in 2022. This schedule is problematic, as the review takes place after the plan is underway, or nearly completed for the year

The year-ahead process described in the Draft WMP Guidelines is an important, positive step in this direction, and should continue to be refined throughout 2023. A key point to determine is the expected filing date of the year-ahead WMPs. (Cal Advocates has previously recommended filing dates in August or early September, which would allow for decisions by December, before the implementation year begins.)⁵⁶ It may be challenging for utilities to file WMPs in February of the year prior to the implementation year, since that necessitates a long lead time for advance planning. On the other hand, a later filing date could result in the bulk of WMP review occurring during the height of fire season.

Energy Safety should host a workshop in 2023 and invite the utilities and interested stakeholders to discuss and refine the year-ahead process. Energy Safety should publish supplemental guidance in 2023 on the year-ahead process a minimum of six months before utilities submit their 2025 WMPs in 2024.

⁵⁵ Per the Extension of the evaluation timeframe for PacifiCorp's 2022 Wildfire Mitigation Plan Update, September 20, 2022, Energy Safety expects to publish its draft decision on PacifiCorp's 2022 WMP Update on November 4, 2022. Allowing time for comment and Commission ratification of the decision will likely result in a final decision in December 2022.

⁵⁶ See, e.g., Comments of the Public Advocates Office on the 2023 Wildfire Mitigation Plan Guideline Development Workshop, May 6, 2022, pp. 9-10.

B. Section 8.4: Data Requests from Stakeholders

1. The final guidelines should clarify the rules for responses to requests to compel or limit stakeholder data requests.

Cal Advocates appreciates inclusion of a process for stakeholders to resolve discovery disputes in the Draft WMP Guidelines. The Draft WMP Guidelines enable stakeholders to submit requests to compel or limit responses to discovery and provide a three-day deadline for responses. By doing this, the Draft WMP Guidelines facilitate timely resolution of such disputes so stakeholders can have as much time as possible to provide meaningful comments on WMP submissions. However, Energy Safety should clarify certain issues in order to strengthen the process.

Energy Safety should clarify whether respondents have three calendar days or three business days to respond. See Cal Advocates recommends that responses be due within three business days so as not to impose onerous work burdens on weekends or holidays. This will facilitate a fair process with more robust participation by all stakeholders.

Moreover, the Draft WMP Guidelines state that a "response to a request to compel or limit a data request *must* be submitted within 3 days of the date that the request was submitted" (emphasis added). ⁵⁹ In line with motion practice under the California Rules of Court, Cal Advocates recommends that Energy Safety state that failure to respond to a request to compel or limit discovery may be deemed as consent to the granting of the request. ⁶⁰ Cal Advocates recommends the following language:

Any response to a request to compel or limit a data request is due within 3 business days of the date the request was submitted to Energy Safety. If the object of a request submits no response, then

⁵⁷ WMP Process and Evaluation Guidelines, Section 8.4.

⁵⁸ WMP Process and Evaluation Guidelines, Section 8.4.4 ("A response to a request to compel or limit a data request must be submitted within 3 days of the date that the request was submitted to Energy Safety.").

⁵⁹ WMP Process and Evaluation Guidelines, Section 8.4.4 ("A response to a request to compel or limit a data request must be submitted within 3 days of the date that the request was submitted to Energy Safety.").

<u>60</u> See 2022 California Rules of Court, Rule 8.54(c) ("A failure to oppose a motion may be deemed a consent to the granting of the motion."), available at: https://www.courts.ca.gov/cms/rules/index.cfm?title=eight&linkid=rule8_54.

the request will be deemed granted.

Establishing a process for hearing and resolving discovery disputes is a positive step. With the clarifications above, Energy Safety can establish a fair, transparent, and reasonable process for all stakeholders.

2. Energy Safety should set a timetable for resolving requests to compel or limit discovery.

The Draft WMP Guidelines lay out a process for expeditiously resolving discovery disputes, with short timeframes for requests and responses. This is vital, given the short period of time available to analyze and comment on WMPs. However, the effectiveness of this discovery process also depends upon Energy Safety issuing its final determination within a similarly expeditious timeframe. Currently, the Draft WMP Guidelines do not include a timeline for Energy Safety to adjudicate requests to compel or limit data requests. 61

Energy Safety should set a deadline of resolving each discovery dispute within three business days from the due date for responses. Energy Safety should revise the Draft WMP Guidelines to state that it will make all reasonable efforts to issue a final determination on requests to compel or limit data requests within three business days. In the event that this is not feasible, Energy Safety should issue a status update to the service list (by the third business day) that indicates when it expects to issue a determination.

Additionally, Energy Safety should state that it may issue questions to both the requestor and the respondent, if necessary. If the request and responses do not provide adequate factual evidence to adjudicate the dispute, Energy Safety should issue questions to both parties within three business days.

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⁶¹ See WMP Process and Evaluation Guidelines, Section 8.4.5. ("Energy Safety will take requests to compel or limit a data request under consideration and will issue a determination on a request to compel or limit a data request after the request and response(s) have been submitted.") (Emphasis added)

C. Section 12: Change Order Requests

1. Energy Safety should require utilities to file change order requests for qualifying changes that occur after their 2023 WMPs are submitted for approval.

The Draft WMP Guidelines state that IOUs may submit a change order request "after approval of an electrical corporation's WMP."⁶² As Cal Advocates has previously pointed out,⁶³ this potentially allows utilities to delay reporting changes to its pending WMP by several months (in the third or even fourth quarter of the year in which the WMP is being implemented).⁶⁴ Additionally, if a utility makes changes to its submitted WMP while it is pending approval, it may not be obligated to document the change at all.

To avoid this situation, Energy Safety should update the Draft WMP Guidelines to incorporate one of the following changes:

- State that a utility may not make any changes to its submitted 2023 WMP that would meet the change order criteria until the 2023 WMP has been approved, or
- State that a utility must file change order requests for changes that meet the change order criteria as soon as practicable after its 2023 WMP is submitted for approval, rather than after approval.

This issue may become moot after 2023, with the shift to the year-ahead process. The 2023 Base WMPs (covering both 2023 and 2024) are expected to be approved prior to 2024. Then, from 2024 onward, the WMPs will be reviewed and approved before implementation begins. As such, it will be reasonable for utilities to file change order requests after their WMPs are approved, as the WMP review period will no longer overlap with the WMP implementation period.

⁶² WMP Process and Evaluation Guidelines, p. 21.

⁶³ See The Public Advocates Office's Comments on Draft Resolution WSD-021 and the Office of Energy Infrastructure Safety's Draft Action Statement on Pacific Gas and Electric Company's 2021 Wildfire Mitigation Plan (WMP) Update Pursuant to Public Utilities Code Section 8386, August 30, 2021, pp. 6-7; see also Public Advocates Office Comments on the Draft 2022 Change Order Guidelines, July 26, 2022, pp. 4-5.

⁶⁴ For example, PG&E's 2021 WMP Update was approved in October 2021, and PG&E's 2022 WMP Update is not yet approved as of the filing of these comments.

⁶⁵ WMP Process and Evaluation Guidelines, pp. 21-22.

⁶⁶ WMP Process and Evaluation Guidelines, p. 2.

V. DRAFT 2023 WMP SCHEDULE 67

A. 2023 WMP Schedule

1. Energy Safety should reduce the overlap between the review period for large and small utilities.

In 2022, there was no overlap between the review period for the large utilities and the small utilities. 68 Cal Advocates supports this schedule, as it allowed intervenors to focus wholly on each set of peer utilities, rather than splitting resources and attention between six utilities.

The 2023 WMP Schedule has a lag of only three weeks between the submission of the large utility WMPs and the small utility WMPs. This means that the majority of the review periods for all utilities overlap: for about six weeks, stakeholders would attempt to analyze both the large and small utilities. The predictable result is that each utility's WMP will receive less comprehensive scrutiny, which could prevent important concerns from coming to light and thereby harm public safety. The overlap between the review periods in 2023 will be particularly challenging given that the WMP guidelines are changing. The 2023 WMPs are likely to be considerably more complex than in previous years, which will raise novel issues for both the utilities and stakeholders.

On the positive side, the 2023 WMP Schedule appropriately provides more time overall for stakeholder review of the 2023 WMPs than in 2022. However, it would benefit stakeholders to reduce the overlap between the review periods of the large and small utilities. Energy Safety should defer the submission dates of the small utility WMPs by two weeks, from April 17 to May 1, with a corresponding two-week shift for all subsequent dates associated with the small utility WMPs.

VI. CONCLUSION

Cal Advocates respectfully requests that Energy Safety adopt the recommendations discussed herein.

⁶⁷ Draft 2023 WMP Schedule, Attachment 1 – 2023 WMP Schedule, October 14, 2022.

⁶⁸ Final 2022 WMP Update Guidelines, December 15, 2021, Attachment 5, pp. 5-6.

Respectfully submitted,

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